

REMARKS

Claims 1 and 3-24 are all the claims pending in the application.

As a result of Applicant's Amendment filed October 19, 2001, claims 1 and 3-24 are now pending in this application. The Examiner rejects:

- claims 4, 6, 8, 10, 12, 14, 16 and 18 under 35 U.S.C. §112, second paragraph, as being indefinite;
- claims 1, 5 and 19 under 35 U.S.C. §103(a) as being unpatentable over Yanagita et al. (Yanagita) in view of Van Havenbergh et al. (Van Havenbergh);
- claims 3, 7, 20 and 21 under 35 U.S.C. §103(a) as being unpatentable over Yanagita in view of Van Havenbergh and further in view of Tsunoda et al. (Tsunoda) and Beguin;
- claims 9, 13, 17 and 18 under 35 U.S.C. §103(a) as being unpatentable over Yanagita in view of Van Havenbergh and further in view of O'Brien;
- claims 11 and 15 under 35 U.S.C. §103(a) as being unpatentable over Yanagita in view of Van Havenbergh, Tsunoda and Beguin and further in view of O'Brien; and
- claims 23 and 24 under 35 U.S.C. §103(a) as being unpatentable over Yanagita in view of Van Havenbergh and O'Brien.

With regard to the §112, second paragraph, rejection, Applicant amends claims 4, 6, 10, 18, 23 and 24 to correct minor informalities; thereby, overcoming the §112, second paragraph, rejections. Applicant respectfully submits that these amendments are made merely for clarification purposes, and do not narrow the scope of the claims 4, 6, 10, 18, 23 and 24.

With regard to the Examiner's prior art rejections, Applicant respectfully traverses these rejections as follows.

With regard to claims 1 and 19, the Examiner acknowledges that Yanagita discloses a film thickness value of 250 µm, and therefore does not disclose a film thickness within the claimed range of 300 to 800 µm. However, the Examiner takes the position that the claimed

range would have been obvious. The Examiner's analysis is incorrect because it relies on Applicant's own disclosure. In particular, the Examiner refers to Applicant's canceled claim 2 for the teaching of film thickness within the range of 200 to 1000 μm , and concludes that, since Applicant did not argue non-obviousness of the 200 to 1000 μm range, it would have been obvious to provide film thickness within the range of 300 to 800 μm . In doing so, the Examiner is essentially basing his argument on impermissible use of hindsight, in that neither the Yanagita nor Van Havenbergh, but only Applicant's own specification, discloses a range of thickness values to be provided.

Therefore, Applicant's independent claims 1 and 19, as well as the dependent claims 3-18 (which incorporate all the novel and unobvious features of their base claim 1) would not have been obvious from any reasonable combination of Yanagita or Van Havenbergh, at least for this reason.

With regard to the claims 9-16, 23 and 24, the Examiner' latest analysis of O'Brien is incorrect. In particular, O'brien does not disclose placing "a first edge of a tip discharge opening at $B+d$ ", as alleged by the Examiner. O'Brien's reference "B" is not a "distance", but a "reference line" which shows the location of first edge 60 (see col. 4, lines 61--63). As explained in Applicant's October 15, 2001 Amendment, O'Brien's distance "+/-d" does not represent the distance from the tip of the drawdown die 24 (i.e., a coater) to the web 12 (i.e., a support), instead distance "d" simply represents the amount by which drawdown die 24 must be adjusted by moving the drawdown die along the slot axis 32, as clearly shown in O'Brien's Fig. 3. In fact, O'Brien does not disclose any specific relationship between film thickness and the

Amendment Under 37 C.F.R. § 1.116
U.S. Appln. No. 09/449,625

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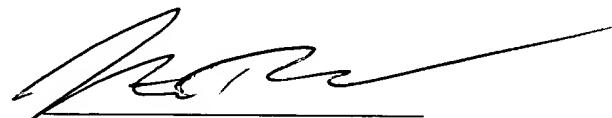
distance between discharge opening of its extrusion coating apparatus 10 and web 12. Therefore, O'Brien is incapable of teaching or suggesting the specific relationship between gap A and thickness B as defined in Applicant's claims 9-16, 23 and 24.

Accordingly, Applicant's claims 9-16, 23 and 24 would not have been obvious from any reasonable combination of the prior art references cited by the Examiner.

In view of the above, reconsideration and allowance of this application are now believed to be in order, and such actions are hereby solicited. If any points remain in issue which the Examiner feels may be best resolved through a personal or telephone interview, the Examiner is kindly requested to contact the undersigned attorney at the telephone number listed below.

Applicant hereby petitions for any extension of time which may be required to maintain the pendency of this case, and any required fee, except for the Issue Fee, for such extension is to be charged to Deposit Account No. 19-4880.

Respectfully submitted,



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APPENDIX
VERSION WITH MARKINGS TO SHOW CHANGES MADE

IN THE CLAIMS:

4. (Amended) A method of manufacturing a radiation image conversion panel according to claim [2] 1, wherein at least one of the support and the extrusion coater is moved, and the speed of the movement is from 0.5 to 50 m/min.

6. (Amended) A method of manufacturing a radiation image conversion panel according to [one of] claim [2] 1, wherein the viscosity of the stimulable phosphor-containing coating solution is from 1 to 10 Pa·s.

10. (Twice Amended) A method of manufacturing a radiation image conversion panel according to [one of] claim [2] 1, wherein the stimulable phosphor-containing coating solution is applied such that a gap A (μm) between a discharge opening at the tip of the extrusion coater and the support, and a film thickness B (μm) of the coated film of the stimulable phosphor-containing coating solution satisfy the following relational expression

$$0.75 \times B + 100 \leq A \leq 1.10 \times B + 130.$$

18. (Amended) A method of manufacturing a radiation image conversion panel according to [one of] claim 1, wherein the extrusion coater is disposed on a surface of a first plane, and the support is disposed on a roller whose axis is located parallel to a direction in which the stimulable phosphor-containing coating solution is discharged, the axis being disposed in a second plane that is located above the discharge opening at the tip of the extrusion coater and parallel to the first plane, such that an angle formed by the direction in which the stimulable phosphor-containing coating solution is discharged and the second plane is from 5 to 60°.

23. (Amended) A method of manufacturing a radiation image conversion panel in which a stimulable phosphor-containing coating solution, which contains at least a stimulable phosphor and a binder, is applied to a support by use of an extrusion coater such that the film thickness of a coated film of the stimulable phosphor-containing coating solution is [in the range of from 300 to 800] 100 µm or more, wherein the stimulable phosphor-containing coating solution is applied such that a gap A (µm) between a discharge opening at the tip of the extrusion coater and the support, and a film thickness B (µm) of the coated film of the stimulable phosphor-containing coating solution satisfy the following relational expression

$$0.75 \times B + 100 \leq A \leq 1.10 \times B + 130.$$

24. (Amended) A method of manufacturing a radiation image conversion panel in which a stimulable phosphor-containing coating solution, which contains at least a stimulable phosphor and a binder, is applied to a support by use of an extrusion coater such that the film thickness of a coated film of the stimulable phosphor-containing coating solution is [in the range of from 300 to 800] 100 µm or more, wherein the stimulable phosphor-containing coating solution is applied such that a gap A (µm) between a discharge opening at the tip of the extrusion coater and the support, and a film thickness B (µm) of the coated film of the stimulable phosphor-containing coating solution satisfy the following relational expression

$$0.80 \times B + 110 \leq A \leq 1.05 \times B + 130.$$